



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
NATIONAL RISK MANAGEMENT RESEARCH LABORATORY
GROUND WATER AND ECOSYSTEMS RESTORATION DIVISION
P.O. Box 1198 Ada, OK 74820

OFFICE OF
RESEARCH AND DEVELOPMENT

December 19, 2012

John and Beth Voyles
U.S. FOIA (b)(6)

Dear Mr. and Mrs. Voyles:

Thank you for allowing representatives of the U.S. Environmental Protection Agency (EPA) to collect samples from your water well as part of our national study of the potential impacts of hydraulic fracturing on drinking water resources. EPA collected samples from your well on July 27, 2011 and on March 26, 2012. Enclosed you will find a copy of the analytical results from our analyses.

Your water well samples were analyzed for a broad spectrum of potential constituents including volatile organic compounds, semi-volatile organic compounds, metals, total petroleum hydrocarbons, anions (including chloride), dissolved gases (including methane), glycols, low molecular weight acids, isotopes, radionuclides, and general water chemistry parameters. The results indicate that most constituents were either not detected, or were detected below EPA's national primary and secondary drinking water standards (which are designed to be protective of domestic use of groundwater, including ingestion). However, one constituent (nitrate) was detected above its national primary drinking water standard and one constituent (aluminum) was detected above EPA's secondary drinking water standards.

The nitrate concentration measured in your well for both sampling rounds exceeded 15 mg N/L which is higher than the EPA primary drinking water standard of 10 mg N/L. The presence of aluminum in your well water above EPA secondary drinking water standards (0.05-0.20 mg/L) is not considered a health risk, although the presence of this constituent can affect the taste, odor, and/or appearance of the water.

Our study is on-going and it is possible we will sample your well again in spring 2013. If you have any questions regarding the analyses, please feel free to contact me at (580) 436-8874.

Sincerely yours,

Richard Wilkin, Ph.D.
Principal Investigator
Southwest PA Retrospective Case Study

Enclosure